

Claims

1. A method of accepting of money items, comprising:
generating individual money items signals with a value that is a function
5 of respective items of money under test,
developing for each of the money items under test, a transformed money
item signal as a function of the value of the money item signal and at least one
variable parameter that is a function of an acceptability criterion for the money
item under test,
10 making a comparison of the values of the transformed money item signals with
a window limit value, and
accepting each money item in dependence upon said comparison.
2. A method according to claim 1 wherein said variable parameter is a
15 function of history data relating to the values of the money item signals for
previously tested money items.
3. A method according to claim 1 or 2 wherein the transformed money
item signal is developed by transforming the money item signal according to the
20 outcome of a rules based expert system.
4. A method according to claim 3 wherein the transformed money item
signal is developed by scaling the money item signal for a money item under test
in accordance with an amplification factor determined in dependence on the
outcome of a comparison of data based on previously tested money items with at
25 least one rule.
5. A method according to claim 4 including two or more of said rules and
including using different amplification factors depending on the outcome of the
comparisons for the rules.
- 30 6. A method according to claim 4 including comparing an average of data
corresponding to the money item signals for previously tested money items with
a first limit value lying within a window delimited by said window limit, and if

said average is not within said first limit, scaling the money item signal for a money item under test in accordance with said amplification factor.

7. A method according to claim 4 or 5 including comparing a maximum
5 value of data corresponding to the values of money item signals for previously tested money items with a second limit value lying within a window delimited by said window limit, and if said maximum value is not within said second limit, scaling the money item signal for a money item under test in accordance with said amplification factor.
- 10 8. A method according to any preceding claim wherein the window limit has a fixed value.
9. A method according to any preceding claim wherein the window limit
15 delimits a window as deviation relative to a window mean, and including re-valuing the money item signal for a money item relative to the window mean, whereby to produce re-valued money item data and developing the transformed money item signal from said re-valued money item data.
- 20 10. A method according to any preceding claim performed in a coin acceptor, and including varying the transformation of the money item signals in dependence on data received from a source externally of the acceptor.
11. A method according to claim 10 wherein the data received from the
25 external source comprises data indicative that of a fraud attack on other acceptors.
12. A method according to any preceding claim wherein the acceptability
30 criterion comprises a fraud criterion corresponding to a fraud attack.
13. A method according to any preceding claim wherein the money items comprise coins or tokens.

14. An acceptor for money items, comprising:
sensor circuitry to provide individual money items signals of a value as a function of respective items of money under test, and
5 a processor configuration to develop for each of the money items under test, a transformed money item signal as a function of the value of the money item signal and at least one variable parameter that is a function of a
acceptability criterion for the money item under test, to make a comparison of the values of the transformed money item signals with a window limit value, and
10 to accept each money item in dependence upon said comparison.
15. A money item acceptor according to claim 14 wherein said variable parameter is a function of history data relating to the values of the money item signals for previously tested money items.
- 15 16. A money item acceptor according to claim 14 or 15 wherein the processor configuration is operable to develop the transformed money item signal by transforming the money item signal according to the outcome of a rule based expert system.
- 20 17. A money item acceptor according to claim 16 wherein the processor configuration is operable to develop the transformed money item signal by scaling the money item signal for a money item under test in accordance with an amplification factor determined in dependence on the outcome of a comparison
25 of data based on previously tested money items with at least one rule.
18. A money item acceptor according to claim 17 including two or more of said rules and wherein the processor configuration is operable to use different amplification factors depending on the outcome of the comparisons for the
30 rules.

19. A money item acceptor according to claim 17 or 18 wherein the processor configuration is operable to compare an average of data corresponding to the money item signals for previously tested money items with a first limit value lying within a window delimited by said window limit, and if said average is
5 not within said first limit, to scale the money item signal for a money item under test in accordance with said amplification factor.

20. A money item acceptor according to claim 17 or 18 wherein the processor configuration is operable to compare a maximum value of data
10 corresponding to the values of money item signals for previously tested money items with a second limit value lying within a window delimited by said window limit, and if said maximum value is not within said second limit, to scale the money item signal for a money item under test in accordance with said amplification factor.

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21. A money item acceptor according to any one of claims 14 to 20 wherein the window limit has a fixed value.

22. A money item acceptor according to any one of claims 14 to 21 wherein
20 the window limit delimits a window as deviation relative to a window mean, and the processor configuration is operable to re-value the value of a money item signal for a money item relative to the window mean, whereby to produce re-valued money item data, and to develop the transformed money item signal from said re-valued money item data.

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23. A money item acceptor according to any one of claims 14 to 23 wherein the processor configuration is operable to control the transformation of the money item signals in dependence on data received from an external source.

30 24. A money item acceptor according to claim 23 wherein the data received from the external source comprises data indicative of a fraud attack on other acceptors.

25. An acceptor according to any one of claim 14 to 24 operable to accept coins or tokens.
- 5 26. A multi-denomination acceptor according to any one of claims 14 to 25.